Flightfax

ARMY AVIATION
RISK-MANAGEMENT
INFORMATION

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The Army has enjoyed a downward trend in accident rates over the last few years. While we continue to experience downward trends in most major categories of accidents, we closed out FY 97 with a slight increase in our Class A flight accident rate. However, our rate of just over 1 Class A accident per 100,000 flying hours is still the third best rate in the history of Army aviation.

That was not an accident;
that was not luck.
That was professionalism;
that was risk management;
that was a successful team effort.

BG Burt S. Tackaberry wears the dual hats of Director of Army Safety and Commander, U.S. Army Safety Center. This month he shares his thoughts on where we are in Army aviation safety.

Let's talk

As I continue to settle into my duties as the Director of Army Safety and Commander of the Army Safety Center, I want to share with you some of my observations. I also want to establish a dialogue with you concerning Army aviation operations and how we can do our job more safely.

Coming into this job, I could not see that the Safety Center did much for commanders out in the field. From that side of the street, it appears that we simply come out and investigate accidents. But the Safety Center does so much more. We work with various organizations—both inside and outside DOD—to make not only Army operations but also Army equipment as safe as possible. We are more than just aviation; we are ground operations, we are explosives, we are environmental, we are biological, we are chemical, we are everything and everywhere the Army is. But, because this is *Flightfax*, let me talk aviation.

The Safety Center works closely with the Army Aviation Center to identify hazards that are causing aviation accidents. This work is ongoing. In the meantime, here is my update on the current status of aviation safety, some accident cause factors and indicators that we believe are worth analyzing further, and some organizational and training issues we are currently reviewing.

The Safety Center recently looked at FY 92 through FY 96 Armywide accident data. One interesting indicator worth noting involved what we classify as "supervisory error." (NOTE: "Supervisory error" refers to the individual in charge in the cockpit; i.e., IP, IE, or PC.) We found that, in Class A through C aviation accidents, supervisory errors increased gradually from 5 percent of all cause factors in FY 92 to 15 percent in FY 96. In these supervisory-error accidents, IP experience averaged almost 1200 hours in FY 92, compared to just over 750 hours in FY 96. PC experience averaged 1327 hours in FY 92, compared to 452 hours in FY 96.

What does this mean? It could indicate an overall decline in Army aviator experience over the past few years, or it may simply show that aviators at this experience level are doing more of the flying.

To identify effective controls, the Aviation Center and the Safety Center are looking at several organizational and training issues. I would like to share my thoughts on a few of them.

"We are in some hard times. There are two things we can do this fiscal year. We can hope that we don't kill 14 aviators and have 12 Class A accidents like we did last year, or we can take action to make sure that we don't. But one thing is for certain: Hope is not enough to save us this year. As a team, as professionals, using risk management as a tool, we can make a difference and make this a safe year."

Issue: Currency vs. proficiency

The two are not synonymous. Individual aviators are not getting as many flight hours as they did in the past, and, in many areas, proficiency equates to hours. For example, can we continue to expect people to maintain proficiency by flying just 1 hour of goggle time every 45 days? In these tough times, with our aircraft becoming more complex, it is time to revisit this issue.

Issue: Leader experience

I look at young lieutenants; they have a much harder life today than I did. They spend a year as a flight platoon leader, and then they go to a staff job. After that, they come back to Fort Rucker to the Aviation Officer Advance Course and then back to the field. They spend a year—if they're lucky, 18 months—as a company commander. A few years later, they are a battalion commander.

We are seeing battalion commanders with less experience in the cockpit, but we expect them to be able to recognize risks that could lead to a dangerous situation. That is why risk management is so important. The ability to use the risk-management process effectively enables even the most inexperienced leader to go to his or her next level of leadership and lay out hazards, risks, and the controls needed to ensure mission accomplishment in the safest manner possible.

Issue: Aviator experience

The warrant officer experience level in line units has changed. I flew with CW3s and 4s all my life. The restructure of units' MTO&E has eliminated some senior warrant officer positions. Now, CW3s and 4s are few at company level.

Issue: Crew coordination

We are evaluating the success of our crew-coordination program and its fielding, sustainment, and evaluation process. We know it is a great tool, but it needs to be updated and sustained. We did a good job in getting it out. In a lot of ways, our crew-coordination program is one of the best safety tools we have. But it has two major problems. It is not a living document, and it is not standardized.

Our crew coordination program must be a living document so we can pinpoint crew-coordination tasks that are surfacing in accidents on a regular basis and focus on those. If it were standardized, everybody would learn the same thing the first time and, as we PCS to other units, the standard remains the same.

Issue: Spatial disorientation

While spatial disorientation has always been a hazard for flight crews, its characteristics have changed. In addition to classic illusions such as leans and coriolis effect, today's missions have created new sources of spatial disorientation. The most critical of these are inadvertent drift and unrecognized gradual descent while at a hover.

In an effort to develop controls for the spatial-disorientation hazard, the Safety Center hosted a spatial disorientation working group last summer. The group developed and recommended control-measure proposals in four major categories: education, training, research, and equipment.

As our missions continue to become more complex and aircrew workloads increase, we can expect that exposure to spatial-disorientation hazards will also increase.

Issue: Digital source collector

Historically, 80 percent of all aviation accidents, both military and civilian, have been related to human performance. Therefore, the human factor has to be the area of major concentration for future accident reduction. This is something the digital source collector has potential to reduce. The DSC is an asset that can provide commanders a training and maintenance resource to ensure "command presence" on all flights. In addition, I believe that aircraft with a flight data recorder or gun-camera capability should always be flown with the devices recording.

Summary

In conjunction with the Aviation Center, the Safety Center will continue to analyze accident data and review these and other issues we believe may be affecting aviation safety. As we identify more specific accident-causing hazards and develop control strategies, we will provide you with this accident-prevention information.

But this is not a one-way street; the lines of communication are open. We need your input regarding your areas of concentration. We also are ready to assist if you identify specific areas in which we may help you with your accident-prevention strategies.

In closing, let me say to each and every member of the Army aviation team—military and civilian, officer and enlisted, crewmember and mechanic: Your professionalism is second to none; your dedication is impressive, your commitment is without question, and your outstanding performance makes what is an inherently dangerous profession safer.

—BG Burt S. Tackaberry, Director of Army Safety and Commander, U.S. Army Safety Center, Fort Rucker, AL, DSN 558-2029 (334-255-2029), tackabeb@safety-emh1.Army.mil

"Statistics show that half of all battalion commanders, two-thirds of all brigade commanders, and every garrison commander will have a fatality during their command."

A word to commanders

Aviation commanders, you have an *extremely* difficult job. It is a much harder job than when I had it, faster than when I was in your position. You are operating at high tempo with limited resources, and you are doing a magnificent job. I hope you will tell me what the Army Safety Center can do to help.

I want to stack the odds as much as I can in the favor of aviators. I want to ensure that the equipment we are giving you is the best equipment, that the procedures we are teaching are the safest procedures, and that the missions we are asking you to perform are as free of unnecessary risk as we can possibly make them. I know you want the same things.

Contact us. Tell us what you are doing. We can show you the statistics; we can tell you, based on the numbers, the most likely scenario for an accident, whether it is hitting a tree or overtorquing an engine. Then, in your mission briefs, you can share that information with your flight crews. Later, when they are out in an Apache and find themselves at a hover in an attack position, they will be aware of the events and situations that are most likely to get them in trouble. If they know what to expect, they can talk about it, prepare for it, know ahead of time what to do to prevent it.

I would love to get a dialogue going. What do you want? Please do not hesitate to let us know what your problems are. If you have a safety issue out there, Commander, I will carry the message for you to the highest levels.

Army Safety Center Aviation POCs—DSN 558-xxxx (334-255-xxxx)

Accident investigations/systems
LTC Versal Spalding 9552
Army National Guard liaison
LTC Tom Shea 9579
Army Reserve liaison
LTC Dave Clark 2376
Attack helicopters
CW5 Mike Moorehead 3703
Aviation life-support equipment
CW5 Dan Medina 9847
Cargo helicopters
CW4 Keith Freitag 3262
MSG Ruben Burgos 3650
Digital source collector
Mr. Gary Rasponi 2194
Engineering
Mr. Gary Rasponi 2194
Flightfax
Ms. Sally Yohn 2676
Fixed wing aircraft
CW4 Wes Hedman 9855
Human factors
Mr. Dwight Lindsey 2046
Legal
LTC Linda Jelonek (SJA) 2924
Ms. Vicki Hendrix (FOIA) 2373
Media & Marketing
Mr. John Hooks 3014
Medical
COL Ed Murdock 2763
Night vision devices
CW5 Bob Brooks 1253
Observation helicopters & UAVs
CW5 Bill Ramsey 2785
CW3 "Stew" Milligan 9857
Operations
MAJ Harry Trumbull 2539
Publications distribution
Ms. Sharrel Forehand 2062
Research & Analysis
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CW4 Keith Freitag 3262
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CW5 Meade Roberts 2443
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Utility helicopters
MAJ Herb Burgess 9853
CW5 Bob Brooks 1253
MSG Kenneth King 9852
CW5 Dan Medina 9847
Web site
Mr. Jason Harlow 2101
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■ C-12-97-ASAM-01: Aircraft icing—April

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■ OH-58-97-ASAM-01: Removal of power-off-maneuver restriction—May

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■ UH-1-97-ASAM-01: Replacement of certain drive shaft clamp bolts—February

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■ UH-1-97-ASAM-03: High-pressure fuel fitting on T43 engine—May

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■ CH-47-97-SOF-01: One-time inspection of forward transmission for nuts manufactured by Hartford Aircraft Products, Inc.—February

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■ C-23-97-SOF-01: Grounding of certain C-23B(Plus) aircraft due to defect in material thickness of rudder and elevator skins—March

■ C-23-97-SOF-02: Release of grounded C-23B(Plus) aircraft for flight—April

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■ UH-1-97-SOF-01: Operational restrictions due to engine N2 accessory drive carrier assembly—January

■ UH-60-97-SOF-01: Improperly machined liners in swashplate assembly—January

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■ SOU-ATCOM-97-03: Lack of standard rigid reach pendants for hookup of certain loads—April

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■ GEN-97-MIM-02: Adjustment procedures for IFF transponder—February

■ GEN-97-MIM-03: Corrosion prevention and control—April

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■ AH-64-97-MIM-03: Failure of pilot and CPG cyclic housings—February

■ AH-64-97-MIM-04: Replacement shock strut mounts for main landing gear—July

■ AH-64-97-MIM-05: Tail-rotor swashplace bearings—July

■ AH-64-97-MIM-06: Lead lag link joint in main-rotor strap pack—August

Cargo

■ CH-47-97-MIM-01: Corrosion damage to engine transmission main housings—January

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■ OH-58A/C-97-MIM-01: Removal of 600-hour retirement interval on certain OH-58A/C engine parts—February

■ OH-58D-97-MIM-02: Inspection/repair of Estane erosion strip—April

■ OH-58D-97-MIM-03: Equivalent limits and nomenclatures between OH-58D and OH-58D(I) power turbine speed and main rotor speed limits—April

■ OH-58A/C-97-MIM-04: Correction to TM 55-1520-228-23, dated 28 February 1997—August

■ OH-58D-97-MIM-05: Polyurethane protective film—October

Utility

■ UH-60-97-MIM-01: Discrepancy in inspection procedure for engine output shaft—January

■ UH-60-97-MIM-02: Electromagnetic environment testing—August

■ UH-60-97-MIM-03: Overhaul/retirement life of main rotor spindle nut—August

The Army Aviation Broken Wing Award recognizes aircrewmembers who demonstrate a high degree of professional skill while recovering an aircraft from an inflight failure or malfunction requiring an emergency landing. Requirements for the award are in AR 672-74: Army Accident Prevention Awards.

■ *CW3 Steven F. Flankey*

1/160th Special Operations Regiment (A)
Fort Campbell, KY

On the final leg of a cross-country flight, CW3 Flankey was pilot in command of an MH-6J. The aircraft was at 500 feet agl and 105 knots when it experienced complete engine failure. The sun had set 35 minutes before, and lunar illumination was zero. The forced landing area chosen was a very dark field with the only visual references being scattered trees that were not identifiable even with NVGs until the aircraft was passing through 100 feet agl. The soft-surfaced field also contained a series of irrigation ditches and erosion-control levies throughout. The entire area was 75 by 120 meters, of which only a small portion was usable for a safe landing. Density altitude was 1100 feet, and there was an 8- to 10-knot crosswind. The aircraft was very near the 3200-pound maximum allowable gross weight limit for safe autorotation.

The initial indications were a left yaw and a change in engine noise. The copilot, who was on the controls at the time, initiated immediate action steps and lowered collective to maintain rotor rpm. At this speed, the MH-6J tends to tuck its nose violently if the engine fails, which it did. Even before the collective was completely lowered, and with the nose already tucked significantly, the crew conducted an emergency transfer of the controls in accordance with the crew brief.

Realizing that the landing surface was soft, possibly wet, CW3 Flankey decided to execute a minimum-ground-run landing. He applied initial pitch at about 10 feet, and then leveled the aircraft at 3 feet and allowed it to touch down. Because of the soft surface, he kept the aircraft light on the skids until it came to a complete stop.

Shortfax
Keeping you up to date

Height-velocity-avoid region

The dual-engine UH-60 brought a safety margin to utility-helicopter operations that wasn't possible with single-engine aircraft. However, as mission demands expand and new equipment is added, Black Hawks frequently operate at higher gross weights than in the past.

UH-60 crews should be aware that operating in height-velocity-avoid regions can be hazardous to them, too, if one engine becomes inoperative.

Avoid regions vary based on gross weight and atmospheric conditions. Pilots should review the information in the operator's manual on the height-velocity-avoid regions for single-engine failure and avoid flying in these danger zones as much as possible.

POC: Mr. Michael Lupo, Utility Helicopter PM Office, Aviation and Missile Command, DSN 645-0076 (205-955-0076), lupo-mv@redstone.army.mil

Audiovisual library now on web

The Defense Automated Visual Information System (DAVIS) is now on the worldwide web. This joint-service library contains more than 26,000 audiovisual productions (films and videotapes) produced and purchased by DOD components to support training, operations, and other requirements.

The DAVIS web site (http://www.redstone.army.mil/davis) is unrestricted and features an easy-to-use full-text search engine that can quickly find and produce detailed descriptions of audiovisual productions in the Defense inventory. The site can then be used to electronically order productions.

Historically, DAVIS was available only to visual-information specialists. That is no longer the case. Everyone is now encouraged to use it, from training NCOs to others responsible for professional development.

POC: Mr. Richard C. Latson, Defense Visual Information Directorate, DSN 328-0640 (703-428-0640), rclatso@hq.afis.osd.mil

Accident briefs

Information based on *preliminary* reports of aircraft accidents

AH1

Class A

F series

■ Aircraft began spinning while making right decelerating turn at 25 to 30 feet agl and 70 KIAS during zone recon. Aircraft hit ground, rolled, and came to rest inverted. Tail boom and guns separated. Both crewmembers sustained minor injuries.

Class E

F series

■ During downwind for landing, aircraft made uncommanded 20-degree right yaw. Pilot felt chatter/feedback in antitorque pedals and landed aircraft. Cause not reported.

■ While unmasking behind hill, aircraft started uncontrolled right turn due to wind. As PC increased airspeed to reposition aircraft, front seat called "Tree." PC then increased collective to clear tree, resulting in an overtorque. Aircraft started right turn into the hill, and N2 and rotor rpm began bleeding off. PC found a place to land as N2 rotor continued to bleed off. Aircraft landed hard with zero forward airspeed.

AH64

Class A

A series

■ Shaft-driven compressor light came on at hover during battle drill training. Crew landed aircraft, performed emergency shutdown, and egressed without injury. SDC caught fire, and flames consumed aircraft.

■ Aircraft was struck by lightning while parked and moored on airfield. Initial estimate of damage is $2 million.

Class C

A series

■ As student was performing ECU lockout of No. 1 engine, No. 2 engine experienced overspeed and was shut down by overspeed protection device. IP took controls and executed autorotation to dry lake bed. Aircraft settled into soil softened by recent rains, stopping abruptly and rocking forward. Extent of damage: right pylon, tail wheel strut, possible damage to 30mm turret, and skin damage to underside of tail boom.

■ Damage to all main-rotor blades was discovered during postflight inspection. Suspect blade strike. Incident is under investigation.

Class E

A series

■ During approach to refueling pad, crew detected fumes in crew station and felt vibrations in airframe. Crew expedited their approach and performed emergency shutdown. Maintenance determined that turbine in ECU seized.

■ During engine runup, crew noted drop in ECU airflow. About 30 seconds later, the SDC caution warning light came on. Crew shut down aircraft without incident. Maintenance inspection revealed faulty shaft-driven-compressor filter.

■ Smoke began to fill both crew stations during approach at night, but there were no caution/warning lights. PC shut down ECU and made emergency landing. Caused by failure of shaft-driven compressor.

CH47

Class B

D series

■ Slingload was inadvertently released at 35 feet agl during approach to field site. Crew noted slight jolt and illumination of master caution light and landed about 50 meters from the load without further incident. The aircraft was not damaged; however, the slingloaded M198 howitzer was damaged beyond repair.

■ Right rear landing gear strut failed when aircraft was set down on 15-degree slope. When PC repositioned aircraft and landed a second time, failed strut damaged fuselage.

Class C

D series

■ Lower drag link of left aft landing gear broke during left cross-slope landing. Aircraft fuselage hit the ground, sustaining damage.

■ While hovering during exfiltration, aircraft drifted rearward, and PI applied forward cyclic and increased thrust. As a result of aircraft movement with ramp partially submerged, ramp door separated from aircraft. Crew aborted mission and landed at nearby airport without incident. Ramp was subsequently recovered without damage and will be reinstalled.

Class E

D series

■ No. 2 flight control hydraulic pump fault light on maintenance panel came on in cruise flight. This was followed by rise in No. 2 flight control hydraulic pressure to 4000 psi and hydraulic oil temperature to 120°. Aircraft landed without further incident. Caused by failure of No. 2 flight control hydraulic pump.

■ With aircraft on ground during slope operations, flight engineer noticed increase in No. 2 flight hydraulic temperature along with a low roaring noise coming from aft transmission area. As he reported this to pilots, No. 2 flight hydraulic pump fault light illuminated on the maintenance panel just as No. 2 flight control pressure light illuminated on master caution panel. Aircraft was immediately shut down. Maintenance replaced No. 2 hydraulic flight boost pump.

OH58

Class B

D(I) series

■ While in cruise flight, crew heard loud bang, followed by engine failure. Crew executed emergency autorotation. Aircraft landed hard, sustaining damage to tail boom, main and tail rotor blades, and tail rotor gearbox.

Class C

D(I) series

■ During GCA approach, transmission oil pressure light came on. Engine operation continued for 10 to 15 minutes before shutdown. Postflight inspection revealed red substance of unknown origin around drive shaft, and transmission oil line was broken and covered in oil. Transmission was replaced.

■ Aircraft experienced transmission overtorque during maintenance test

flight. Aircraft landed without incident.

■ Aircraft became uncontrollable about 5 seconds after positive transfer of controls from PC to PI. Aircraft was in nose-high attitude and left bank when PC regained control. Quick check of engine monitor page indicated that both high engine and high mast torque limits had been exceeded. Aircraft was landed without further incident.

■ Engine temperature peaked at 1003°during engine start, resulting in hot start. Aircraft was shut down without incident.

D series

■ After completing simulated engine failure at hover, pilot began increasing throttle to 100 percent engine rpm. At 95 percent rpm, a "FADEC FAIL" message displayed on multifunction display. Authority digital electronic control still indicated it was in automatic mode. IP reduced throttle to idle with no corresponding reduction in engine rpm. IP then switched to FADEC manual mode, and engine rpm reduced to idle. Crew completed normal shutdown. No limits were exceeded. Maintenance repaired wire at ECU cannon plug pin 4 (interface harness) that transmits signal between ECU and hydromechanical unit.

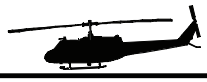
TH67

Class D

A series

■ Bird strike in cruise flight damaged left and right windscreens and pilot's window.

UH1



Class E

H series

■ After landing in LZ, off-loading passengers reported fluid leaking from bottom of aircraft. CE confirmed leak, and PC performed emergency shutdown. During shutdown, aircraft experienced complete loss of hydraulics due to crack in hydraulic line under B nut. Maintenance replaced line.

■ During cruise at 2000 feet and 90 knots, pilot noted engine oil temperature increase above redline, and aircraft landed at nearby airport. Engine anti-ice and oil thermal bypass valves were replaced.

V series

■ During localizer no-precision approach in IMC, N2 needle dropped to zero. Flight was continued to VMC, and aircraft was landed on grass adjacent to runway. No other engine or instrument problems or indications were observed. Cause not reported.

UH60

Class B

A series

■ Aircraft struck power lines at 400 feet agl during medevac training. Aircraft came to rest upright.

Class C

K series

■ Crew noted "thump" during hot refueling in preparation for maintenance test flight. PI noted fuel seepage from No. 5 auxiliary fuel cell while checking the cargo compartment. Crew terminated refuel operations and parked aircraft without further incident. During inspection, internal auxiliary fuel system unisex valve was discovered in closed position, resulting in overpressurization damage to Nos. 5 and 6 auxiliary fuel cells during refueling. Internal tanks had recently been re-installed following phase maintenance.

A series

■ Unbeknownst to crew, right-hand oil cooler access door separated during taxi for takeoff. Aircraft was flown for 1.5 hours without incident. Postflight inspection revealed that door had contacted main rotor system, tail rotor gearbox cover, and tail rotor blades. Door was found on airfield.

■ APU panel came off in flight. Postflight inspection revealed damage to one main rotor blade.

Class D

A series

■ Crew smelled something hot while repositioning aircraft after maintenance on No. 1 engine. Postflight revealed that V-band on No. 1 engine had come loose. No. 1 engine cowling and PAS and LDS sheaths melted, and engine cowling latch retainer was damaged.

Class E

A series

■ During instrument flight evaluation, IE noticed center windscreen start to crack. OAT was 0°C and windshield heat was on. By the time aircraft landed, center windscreen had cracked its full length.

C12

Class E

C series

■ During postflight, metal separation was discovered on left lower wing section. Maintenance repaired wing and aircraft was released for flight.

■ Stall warning horn stopped sounding during slow flight training. As IP started to troubleshoot problem, crew detected smell of smoke in cockpit. IP terminated maneuver and landed aircraft at nearest airport without incident. Maintenance replaced faulty speaker for the stall warning system.

D series

■ During runup for test flight, No. 1 engine stopped responding to power lever inputs. Caused by failure of fuel control unit.

F series

■ No. 1 fire pull handle illuminated during cruise flight. PC initiated emergency procedure, but light remained on although no visible indication of fire was observed. Aircraft returned to base without incident, where maintenance determined that No. 3 fire detection sensor was improperly positioned. Sensor was resting against engine bleed air valve, causing false indications.

■ As full power was applied during takeoff roll, No. 2 prop failed to produce 2000 rpm. Crew aborted takeoff and taxied aircraft back to parking without incident. Maintenance inspection confirmed inoperable prop gauge; it had stuck at 1670 rpm. Prop tach gauge was replaced.

O5

Class E

DHC-7

■ During postflight inspection, small dent was found in leading edge of right wing, outboard of No. 4 engine. Indention suggested bird strike.

■ No. 1 hydraulic pressure indicated less than normal after Nos. 1 and 2 engine start. Troubleshooting revealed faulty pressure transmitter.

For more information on selected accident briefs, call DSN 558-2785 (334-255-2785).

Aviation messages

Recap of selected aviation safety messages

Aviation safety-action messages

AH-64-98-ASAM-01, 201556Z Oct 97, maintenance mandatory.

T700-GE-701 yellow and blue engine harnesses have been redesigned to make them moisture/fault resistant. The purpose of this message is to provide inspection criteria and guidance for identifying and replacing all Phase 0, I, and II design harnesses with the moisture-resistant Phase III harnesses.

AMCOM contact: Mr. Howard Chilton, DSN 746-7271 (205-876-7271), chilton-hl@redstone.army.mil

CH-47-98-ASAM-01, 151327Z Oct 97, maintenance mandatory.

A CH-47D in cruise flight recently entered an uncommanded nose-down left roll that failed to respond to corrective inputs. The crew reported that the aircraft completed a 360-degree roll. Other flight-control incidents have also been reported and investigated with no conclusive findings. These reports include uncommanded inputs and control lockup.

The purpose of this message is to gather information about other incidents of uncommanded control inputs or lockup within the H-47 community. This ASAM will remain in effect until rescinded or superseded.

AMCOM contact: Mr. Dave Scott, DSN 897-2068 (205-313-2068), scott-dc@redstone.army.mil

CH-47-98-ASAM-02, 231737Z Oct 97, maintenance mandatory.

CH-47-96-ASAM-01 was issued to require inspection and removal of certain aft landing gear drag links that were susceptible to stress corrosion cracking. That ASAM required that the drag links be replaced by 6 November 1997.

The purpose of this message is to extend that date to 30 April 1999. A system safety risk assessment has been written to identify the additional risk associated with this extension.

AMCOM contact: Mr. Dave Scott, DSN 897-2068 (205-313-2068), scott-dc@redstone.army.mil

UH-1-98-ASAM-01, 201509Z Oct 97, maintenance mandatory.

Since the oil debris detection system (ODDS) was fielded, several problems have surfaced with installation, operation, and manual references. The purpose of this message is to correct deficiencies associated with ODDS installation and provide maintenance information and requirements.

AMCOM contact: Mr. Robert Brock, DSN 788-8632 (205-842-8632), brock-rd@redstone.army.mil

UH-60-98-ASAM-02, 071542Z Oct 97, maintenance mandatory.

Push rods (P/Ns 70400-08155-050 and -051) manufactured by Versatile Machining, Inc. (cage code 6S522) have not been tested and must be removed from service. Engineering estimates that 100 hours of additional service is acceptable without incurring a significant risk due to this component.

The purpose of this message is to require both removal from service and stock and disposal of all subject push rods.

AMCOM contact: Mr. Dave Scott, DSN 897-2068 (205-313-2068), scott-dc@redstone.army.mil

UH-60-98-ASAM-03, 302108Z Oct 97, maintenance mandatory.

The swashplate link (P/N 70400-08110-054) manufactured by TEK (cage code 65780) recently completed engineering testing. Results indicate that the part does not conform to process specifications of the original manufactured component.

The purpose of this message is to direct removal of subject swashplate links no later than 30 June 1999.

AMCOM contact: Mr. Dave Scott, DSN 897-2068 (205-313-2068), scott-dc@redstone.army.mil

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Class A Accidents *through October*

		Class A Flight Accidents		Army Military Fatalities	
		97	98	97	98
1ST QTR	October	0	2	0	0
	November	0		0	
	December	1		0	
2D QTR	January	2		2	
	February	0		0	
	March	2		1	
3D QTR	April	2		2	
	May	1		1	
	June	3		0	
4TH QTR	July	1		8	
	August	0		0	
	September	0		0	
	TOTAL	12	2	14	0

U.S. ARMY SAFETY CENTER

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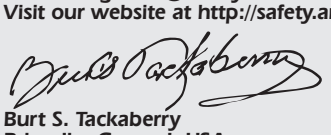

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